

Hands-on Python – Exercises – Day 1

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Exercise 0

Open an editor and configure it, so it fits your need.

Recommendations:

- Show line numbers (good for error searching)
- Set indentation to 4 spaces
- Maybe there is an option to make automatic indentation
- Syntax highlighting for python

Exercise 1

- Execute the program `hello.py`
- Read the file, and change the program, so it says hello to somebody else.
- Change it, so after greeting it asks about your day.
- Change it, so it asks your name, and then says hello to you

Exercise 2

Write a program, that

- saves "Banana" to a variable, and "Apple" to a second variable
- prints the first 3 letters of "Banana"
- prints "BananaBananaBananaBanana"
- prints "BananaAppleBananaAppleBananaApple"

Exercise 3

Write a program, that takes a string as input, and replaces all occurrences of "one" and replaces it by "1". The capitalization of one should not matter, so "one", "One", "ONE", "oNE" should give the same result. (Use the replace operation only once!)

Exercise 4

- Write a list, containing: '42', "What's the question", 1337, ["London", "England"], 3.1415, 3j-4]
- Remove the entry 3.1415
- Add ["Madrid", "Spain"] and "Berlin", "Germany"
- Try to add the first element and the third (the result should be 1379)

Exercise 5

Write a program, that takes a string with capital letters separated by spaces, and print it sorted from Z to A, separated by commas.

Exercise 6

Guess my number!

Write a program, that reads in two numbers, print some success message if the numbers are the same, or if the first number is bigger or smaller than the second one.

Example: First number is 37.

User input: 13 ⇒ "Nope. My number is bigger"

User input: 42 ⇒ "Nope. My number is smaller"

User input: 37 ⇒ "YES! This is my number!"

Exercise 7

Guess my number - part 2!

Extend your guessing program in a way, that you can repeat to enter a number until you have the right one.

Exercise 8

Solve some exercises from <http://codingbat.com/python>.

You should be able to solve exercises from Warmup-1, String-1, Logic-1 and List-1